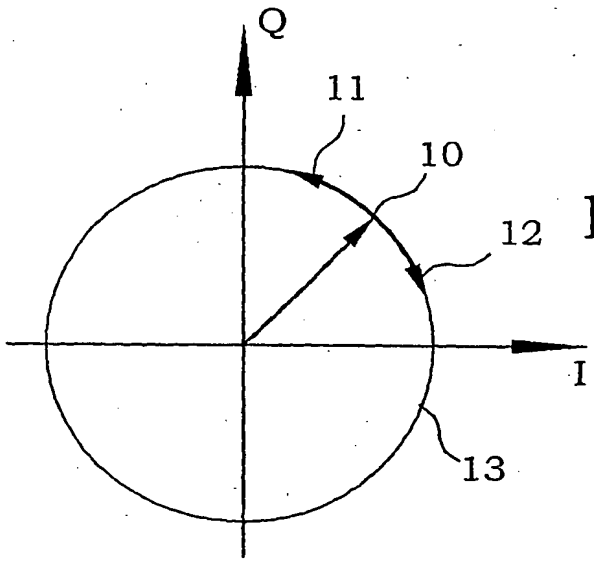


Fig. 1

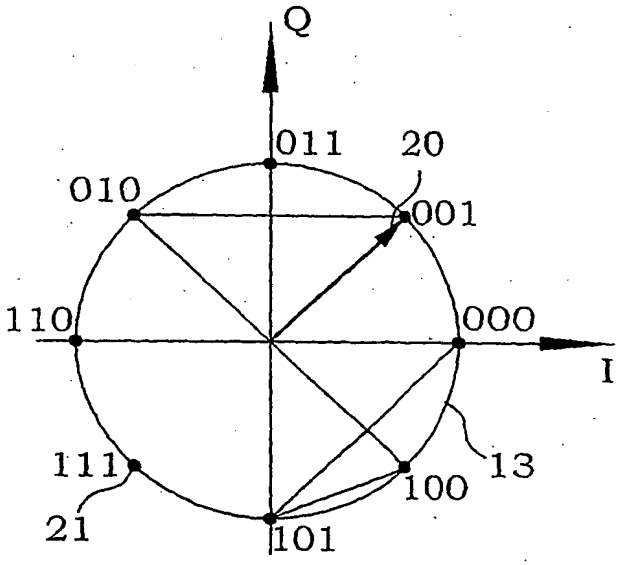


Fig. 2

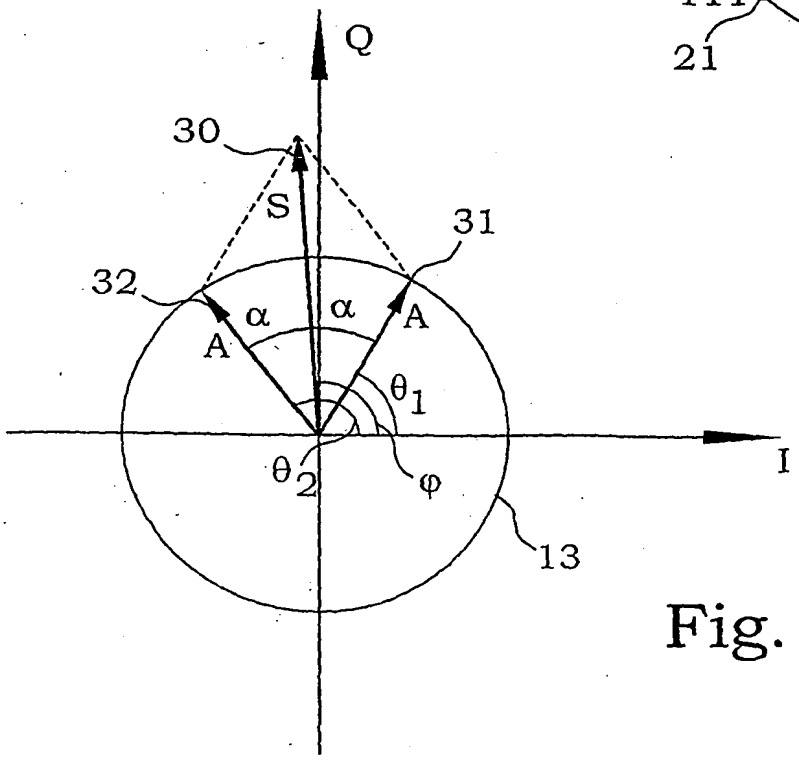


Fig. 3

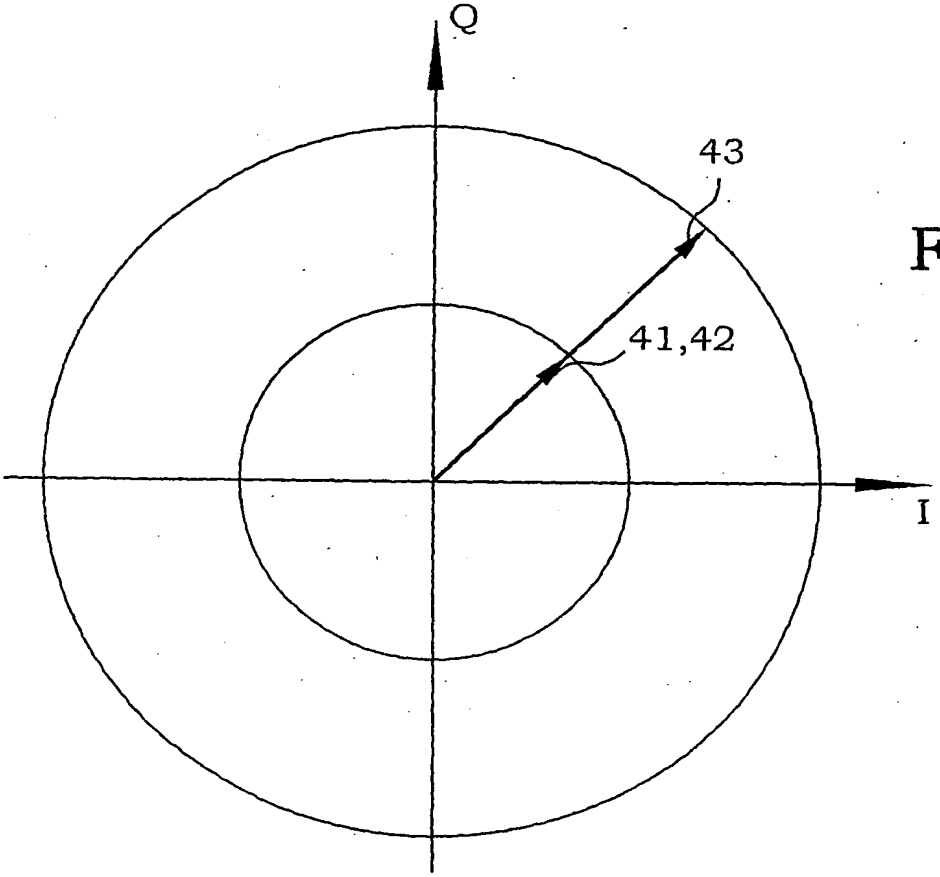


Fig. 4

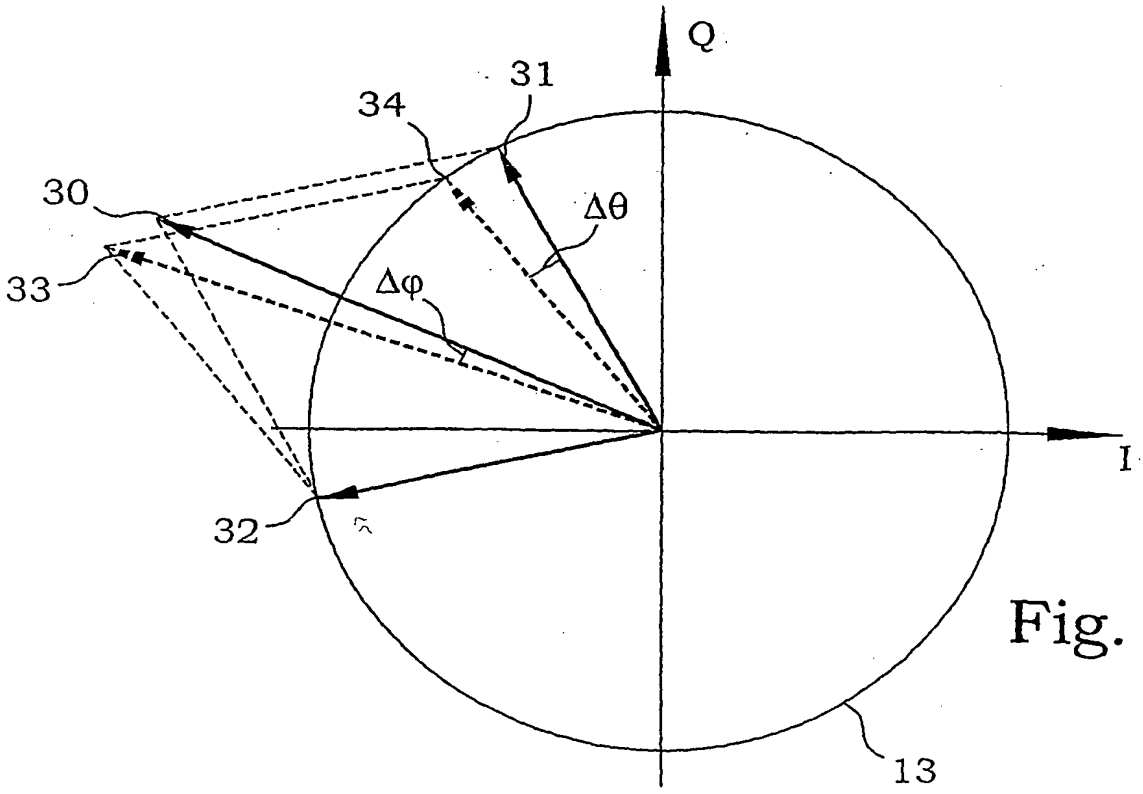


Fig. 5

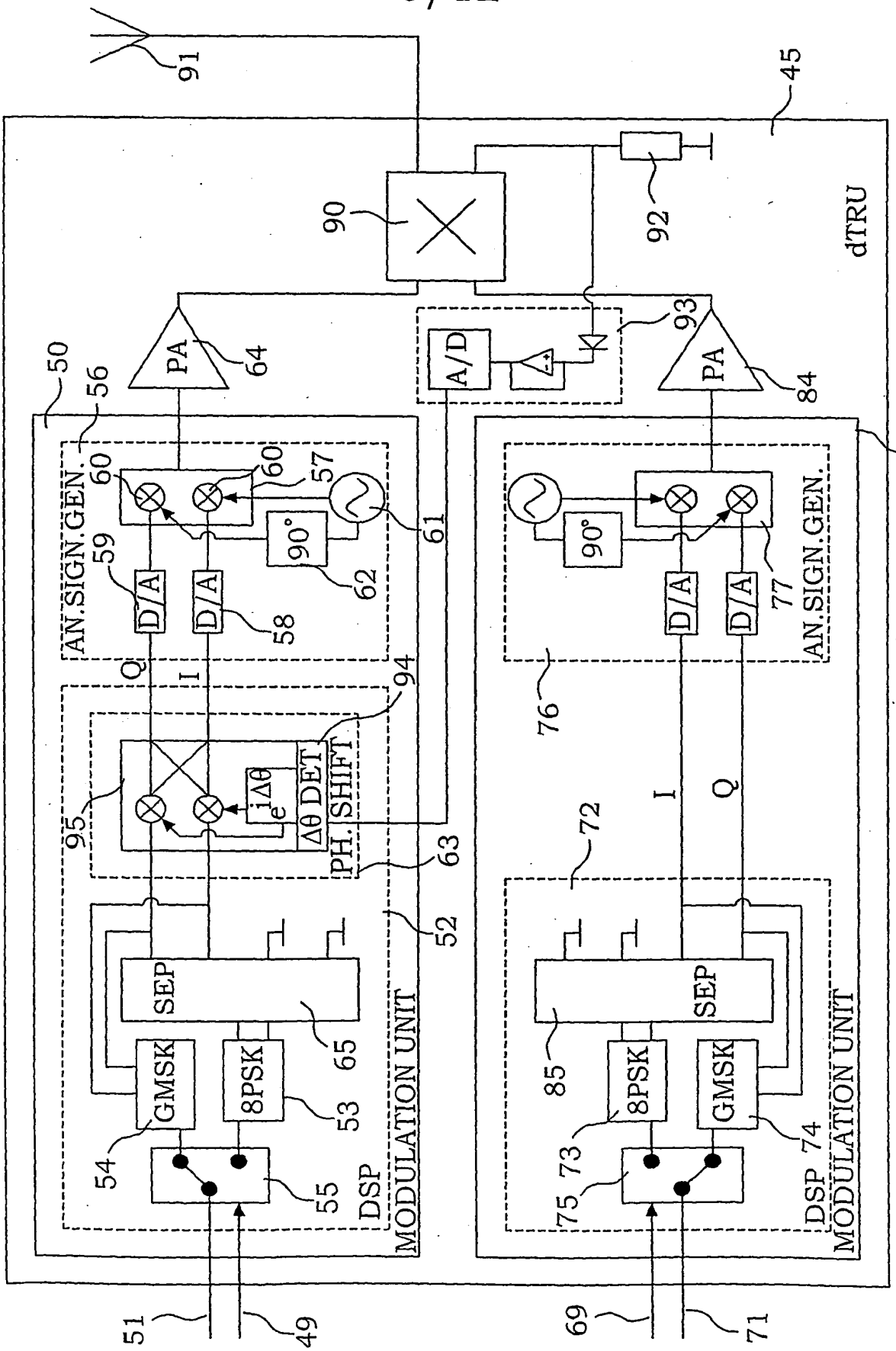

91
45
dTRU
90
92
93
PA
64
A/D
PA
84
50
56
70
AN.SIGN.GEN.
60
57
61
90°
62
59
D/A
58
Q
I
94
PH. SHIFT
95
63
52
SEP
GMSK
8PSK
65
53
54
55
DSP
MODULATION UNIT
76
77
72
85
73
74
75
51
49
69
71

Fig. 6

10/510338

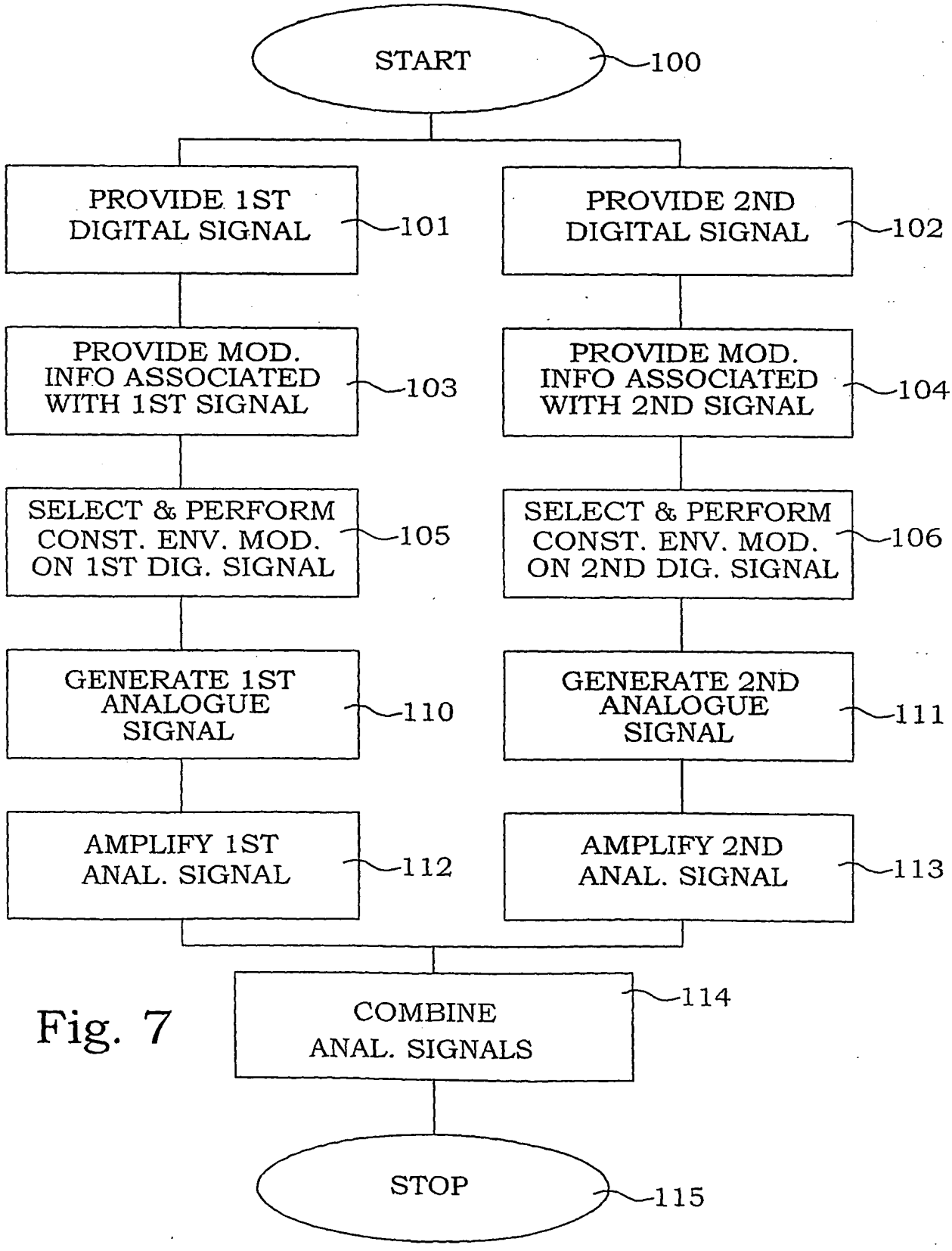


Fig. 7

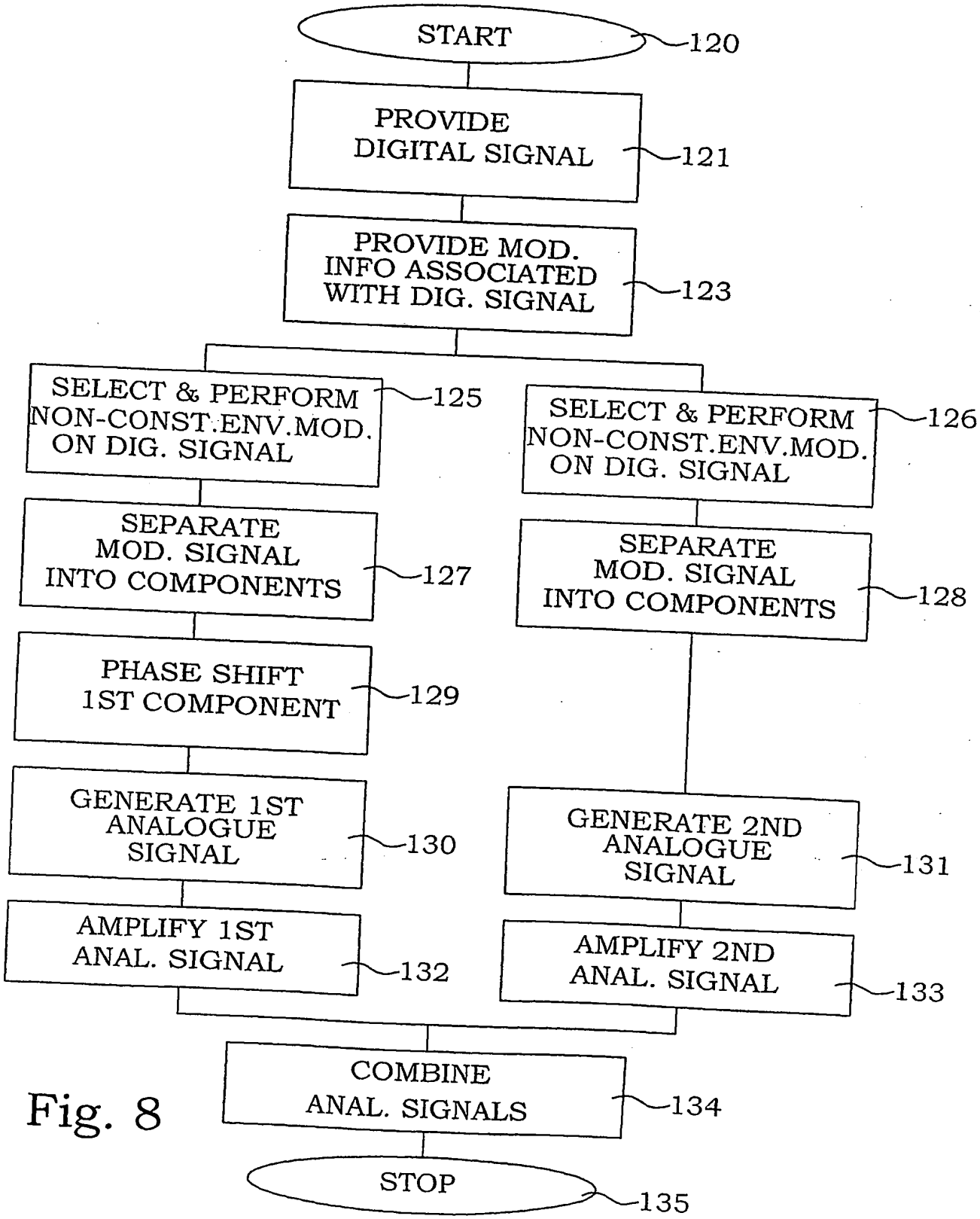

START
120
PROVIDE DIGITAL SIGNAL
121
PROVIDE MOD. INFO ASSOCIATED WITH DIG. SIGNAL
123
SELECT & PERFORM NON-CONST.ENV.MOD. ON DIG. SIGNAL
125
SELECT & PERFORM NON-CONST.ENV.MOD. ON DIG. SIGNAL
126
SEPARATE MOD. SIGNAL INTO COMPONENTS
127
SEPARATE MOD. SIGNAL INTO COMPONENTS
128
PHASE SHIFT 1ST COMPONENT
129
GENERATE 1ST ANALOGUE SIGNAL
130
GENERATE 2ND ANALOGUE SIGNAL
131
AMPLIFY 1ST ANAL. SIGNAL
132
AMPLIFY 2ND ANAL. SIGNAL
133
COMBINE ANAL. SIGNALS
134
STOP
135

Fig. 8

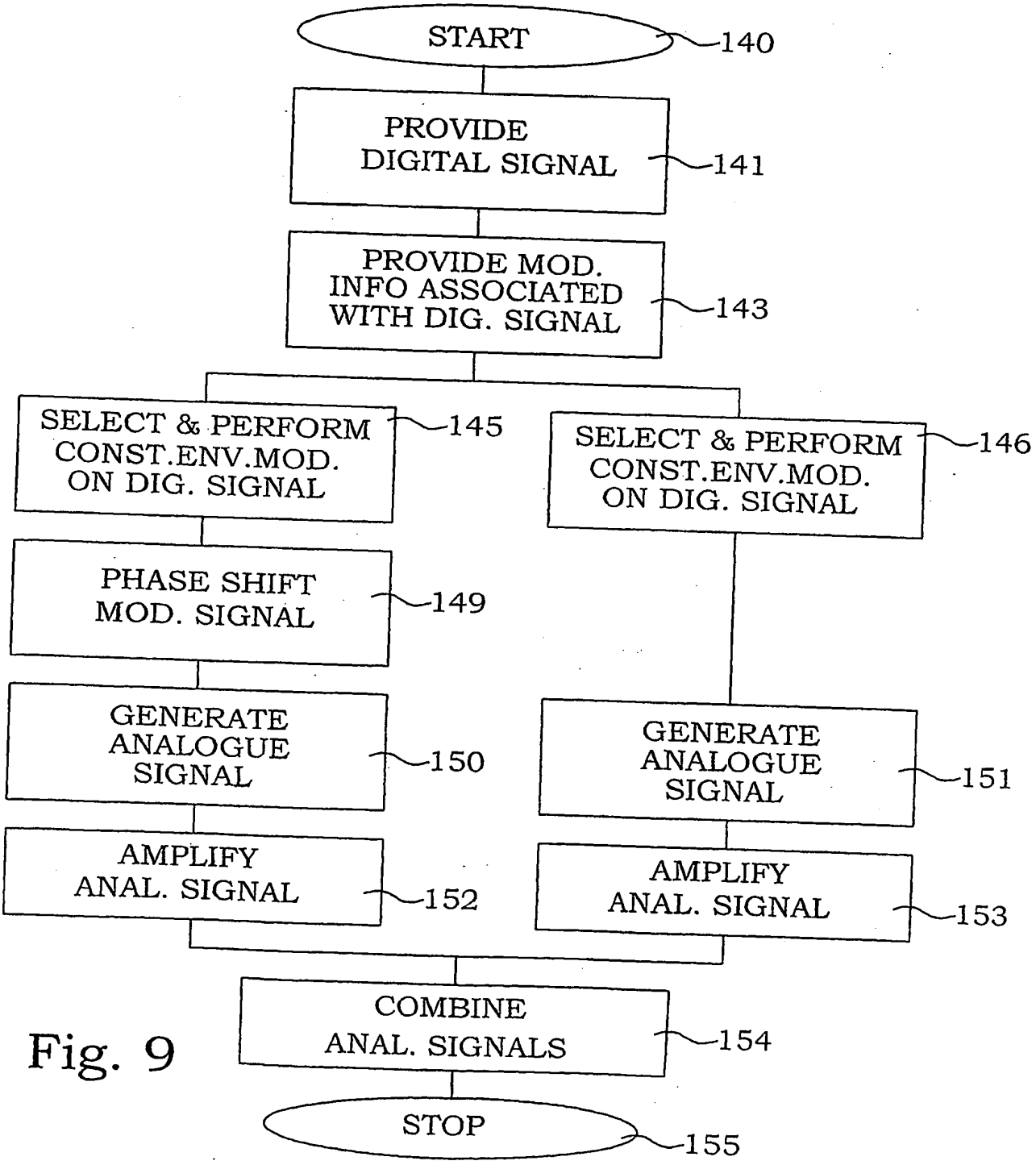

START
140
PROVIDE DIGITAL SIGNAL
141
PROVIDE MOD. INFO ASSOCIATED WITH DIG. SIGNAL
143
SELECT & PERFORM CONST.ENV.MOD. ON DIG. SIGNAL
145
SELECT & PERFORM CONST.ENV.MOD. ON DIG. SIGNAL
146
PHASE SHIFT MOD. SIGNAL
149
GENERATE ANALOGUE SIGNAL
150
GENERATE ANALOGUE SIGNAL
151
AMPLIFY ANAL. SIGNAL
152
AMPLIFY ANAL. SIGNAL
153
COMBINE ANAL. SIGNALS
154
STOP
155

Fig. 9

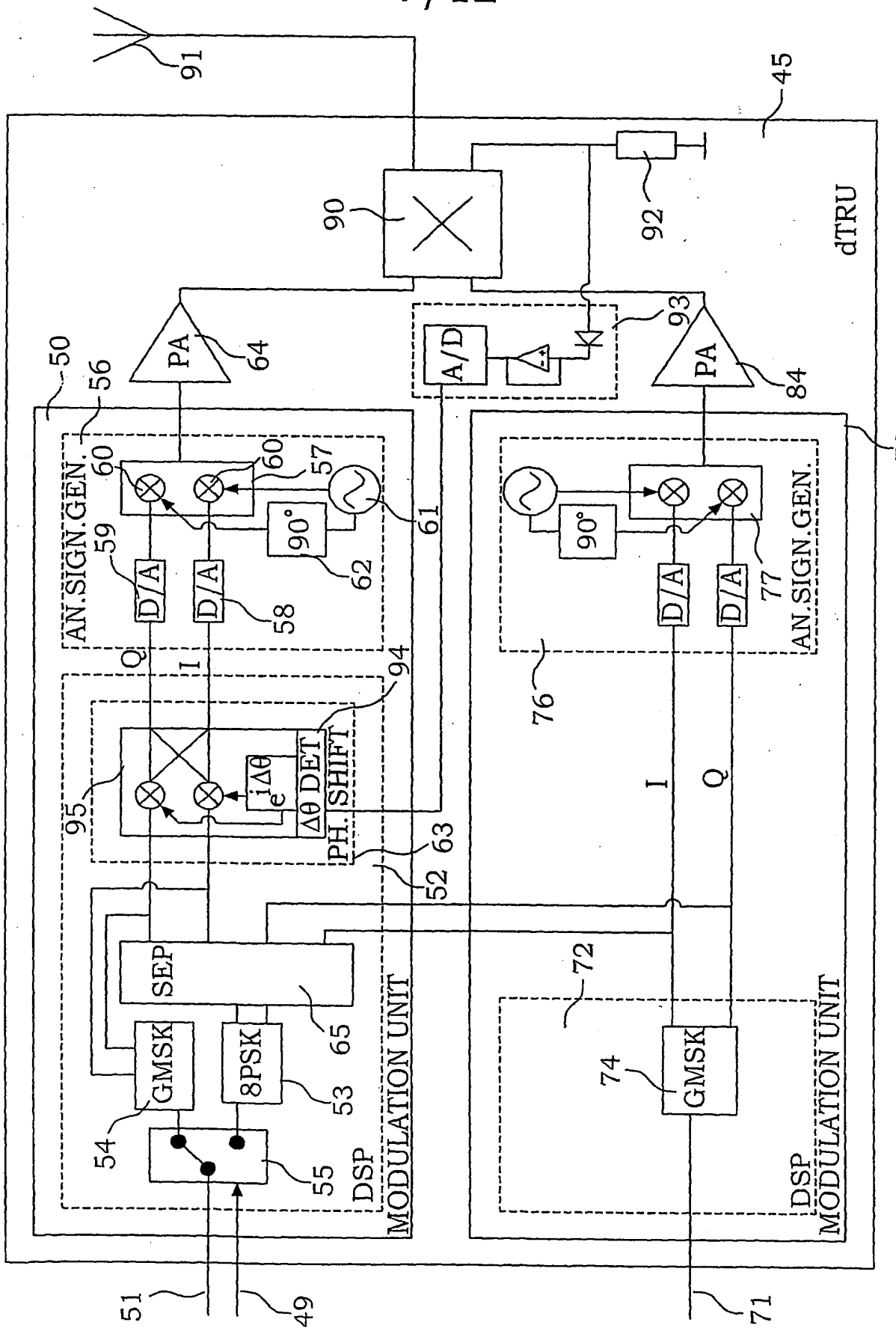

91
45
dTRU
90
92
93
A/D
PA
64
PA
84
50
56
70
AN.SIGN.GEN.
60
60
57
61
90°
62
59
D/A
D/A
58
Q
I
94
95
$e^{i\Delta\theta}$
Δθ DET
PH. SHIFT
63
52
SEP
65
GMSK
8PSK
53
54
55
DSP
MODULATION UNIT
76
77
AN.SIGN.GEN.
72
74
GMSK
DSP
MODULATION UNIT
51
49
71

Fig. 10

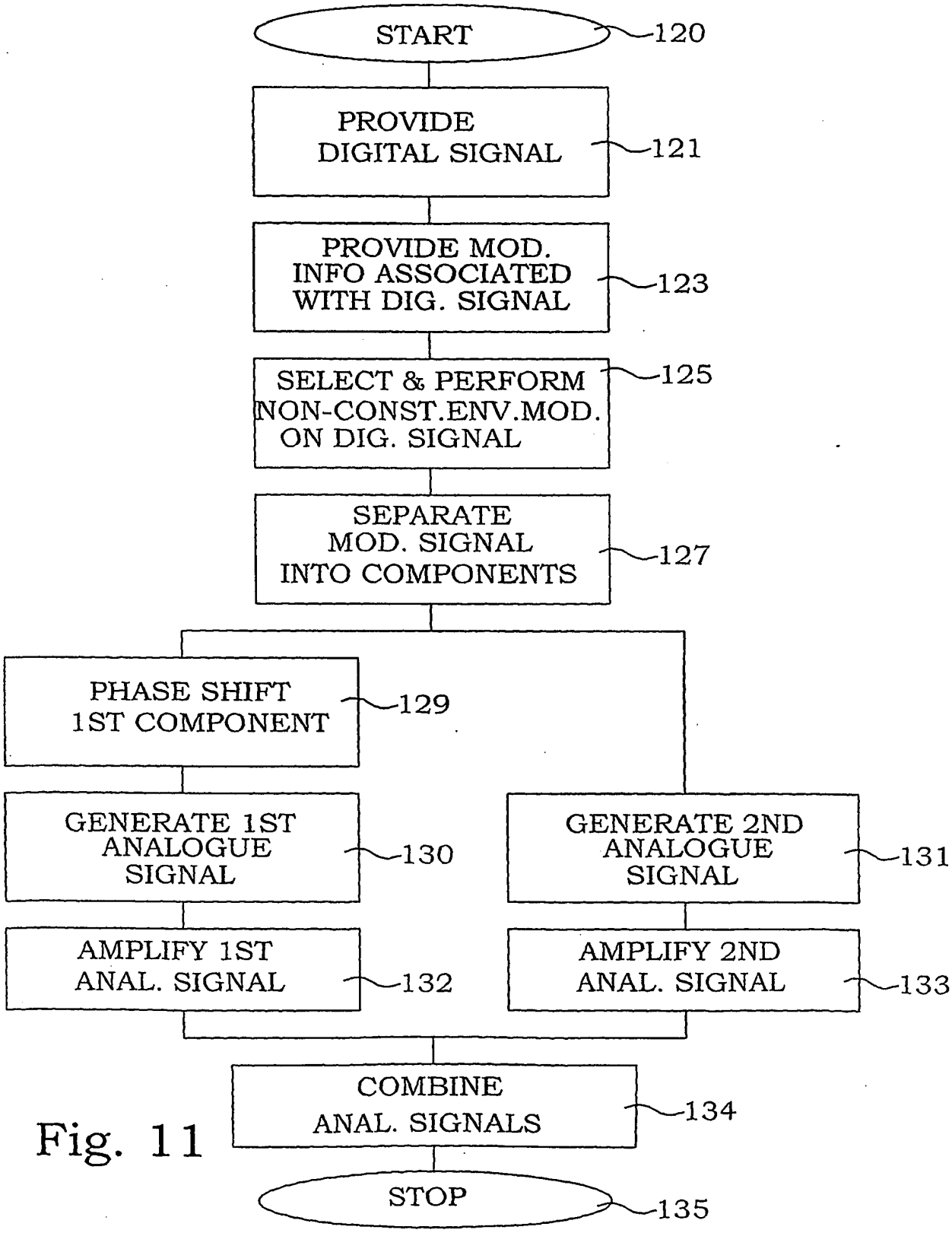

START
120
PROVIDE DIGITAL SIGNAL
121
PROVIDE MOD. INFO ASSOCIATED WITH DIG. SIGNAL
123
SELECT & PERFORM NON-CONST.ENV.MOD. ON DIG. SIGNAL
125
SEPARATE MOD. SIGNAL INTO COMPONENTS
127
PHASE SHIFT 1ST COMPONENT
129
GENERATE 1ST ANALOGUE SIGNAL
130
GENERATE 2ND ANALOGUE SIGNAL
131
AMPLIFY 1ST ANAL. SIGNAL
132
AMPLIFY 2ND ANAL. SIGNAL
133
COMBINE ANAL. SIGNALS
134
STOP
135

Fig. 11

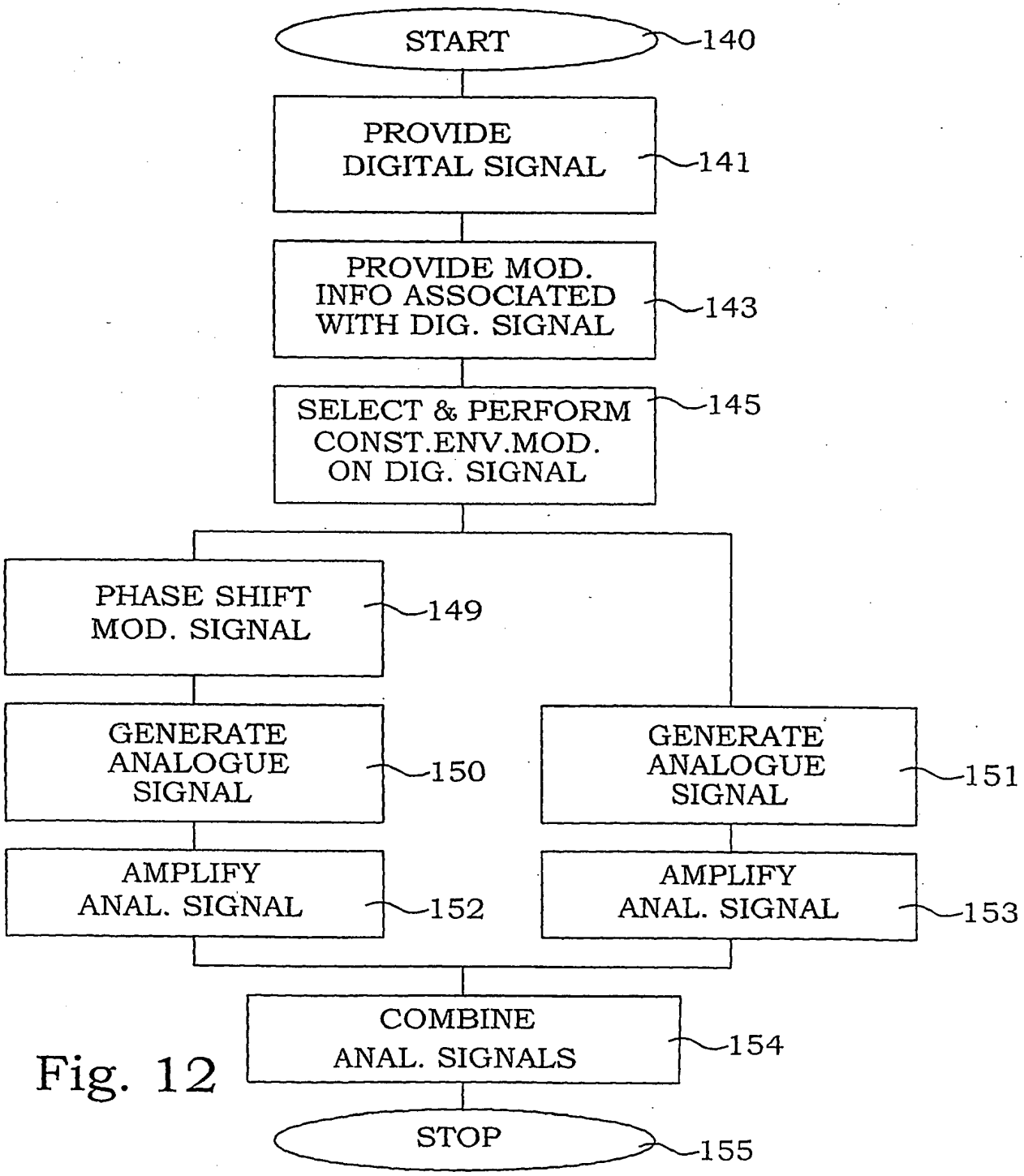

START
140
PROVIDE DIGITAL SIGNAL
141
PROVIDE MOD. INFO ASSOCIATED WITH DIG. SIGNAL
143
SELECT & PERFORM CONST.ENV.MOD. ON DIG. SIGNAL
145
PHASE SHIFT MOD. SIGNAL
149
GENERATE ANALOGUE SIGNAL
150
GENERATE ANALOGUE SIGNAL
151
AMPLIFY ANAL. SIGNAL
152
AMPLIFY ANAL. SIGNAL
153
COMBINE ANAL. SIGNALS
154
STOP
155

Fig. 12

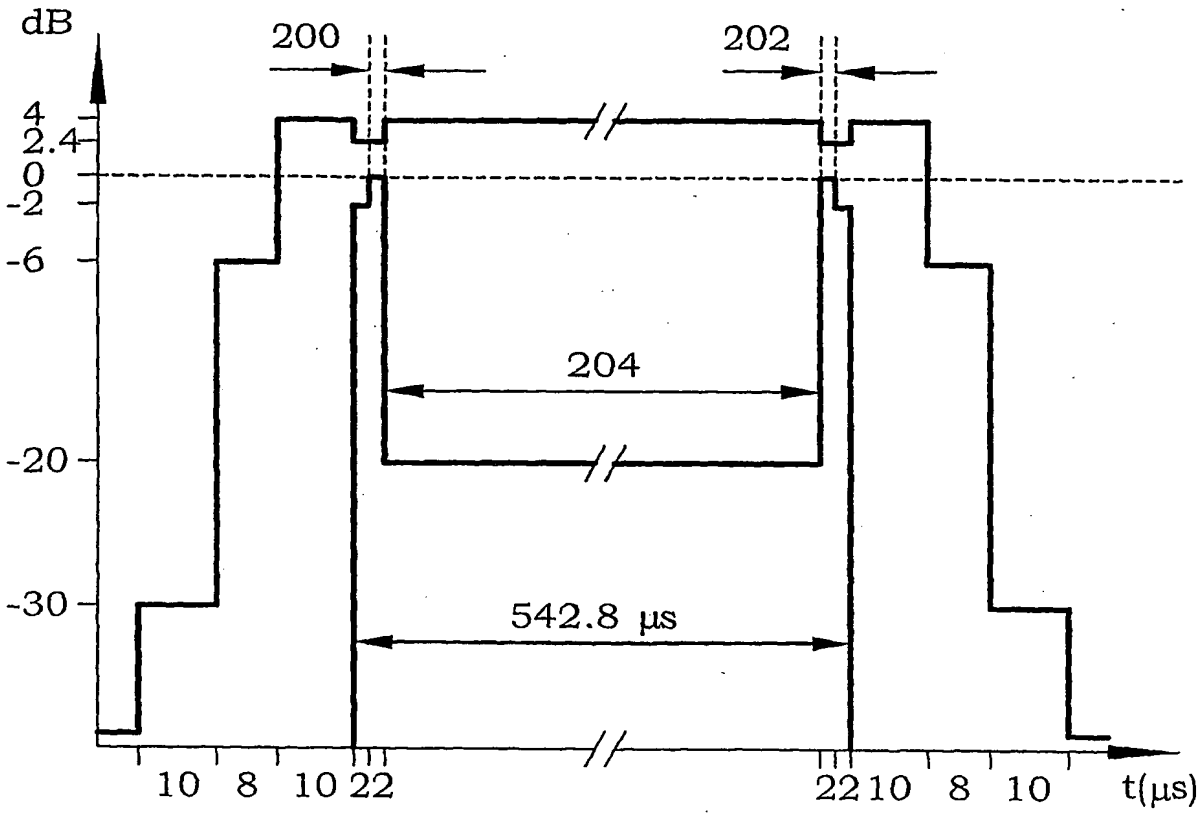
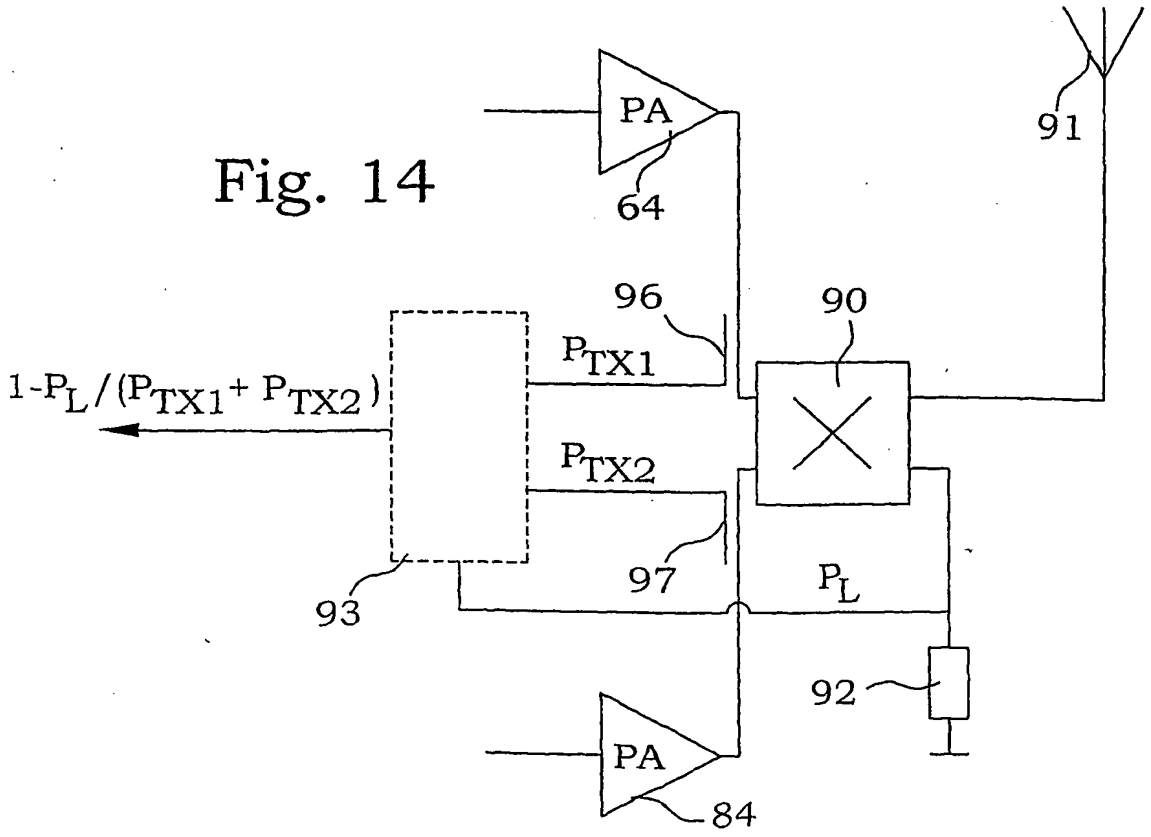

dB
200
202
4
2.4
0
-2
-6
204
-20
-30
542.8 µs
10 8 10 22
22 10 8 10
t(µs)

Fig. 13

Fig. 14


PA
64
91
96
90
P_{TX1}
$1-P_L/(P_{TX1}+P_{TX2})$
P_{TX2}
97
P_L
93
92
PA
84

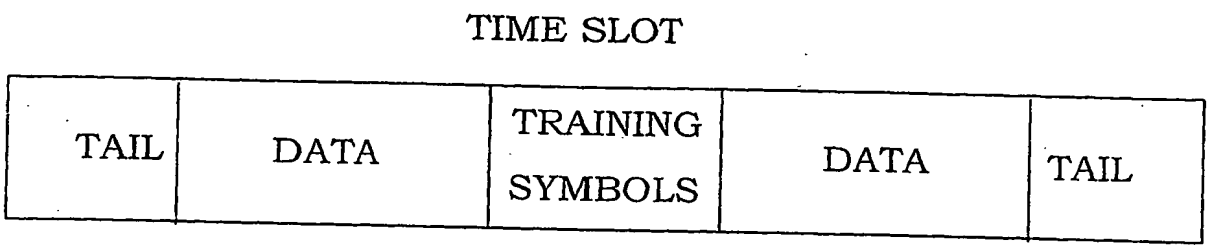


Fig. 15

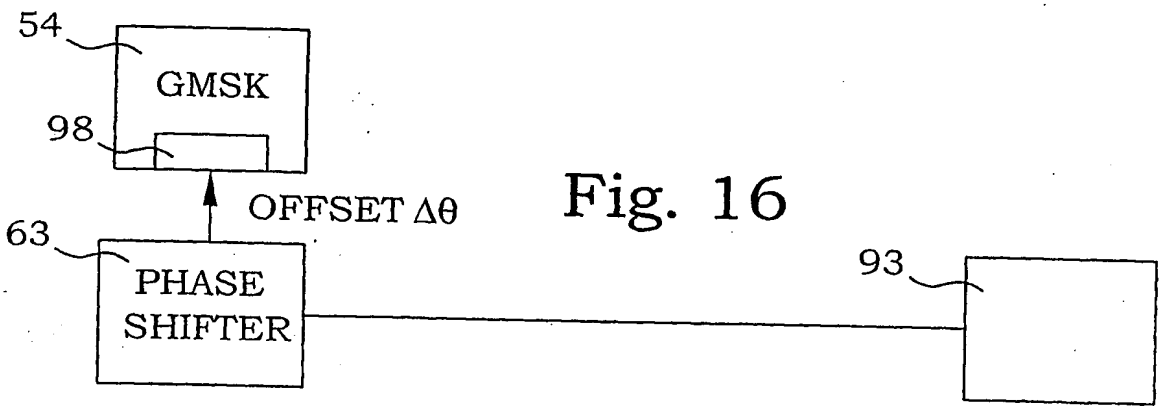


Fig. 16

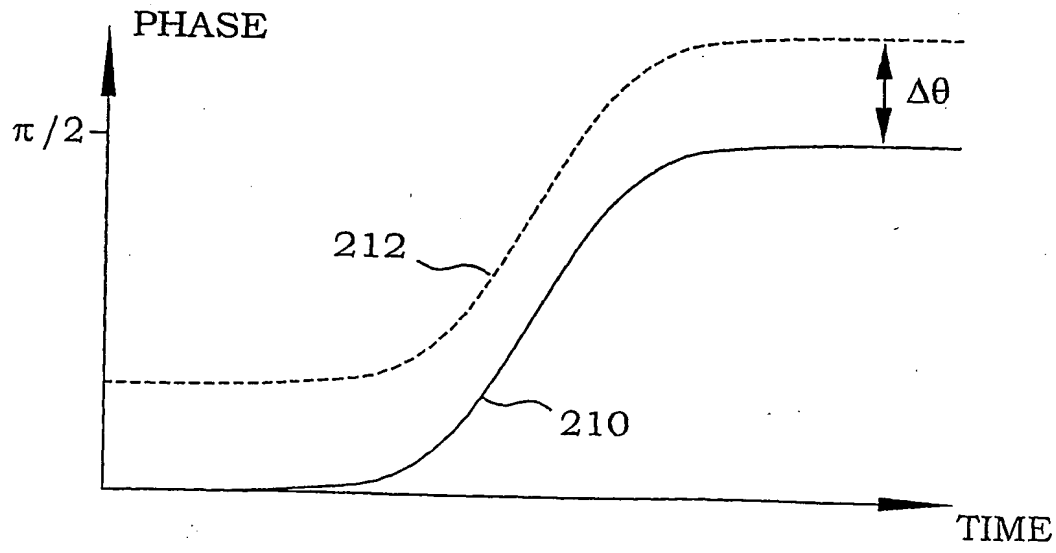


Fig. 17

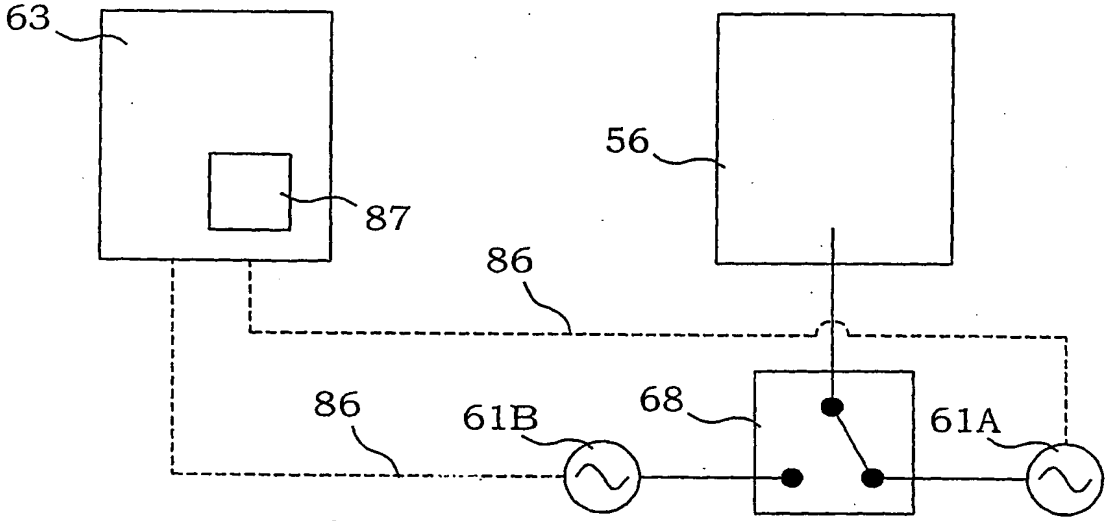


Fig. 18

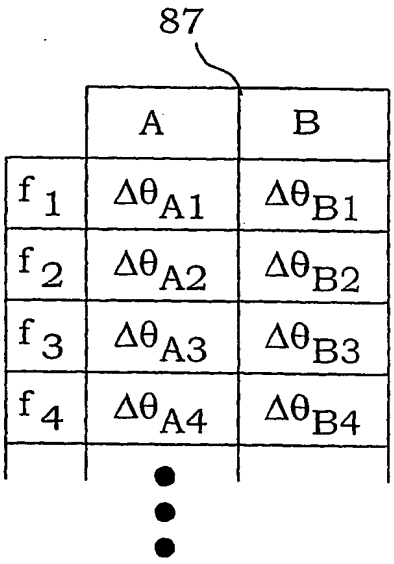


Fig. 19

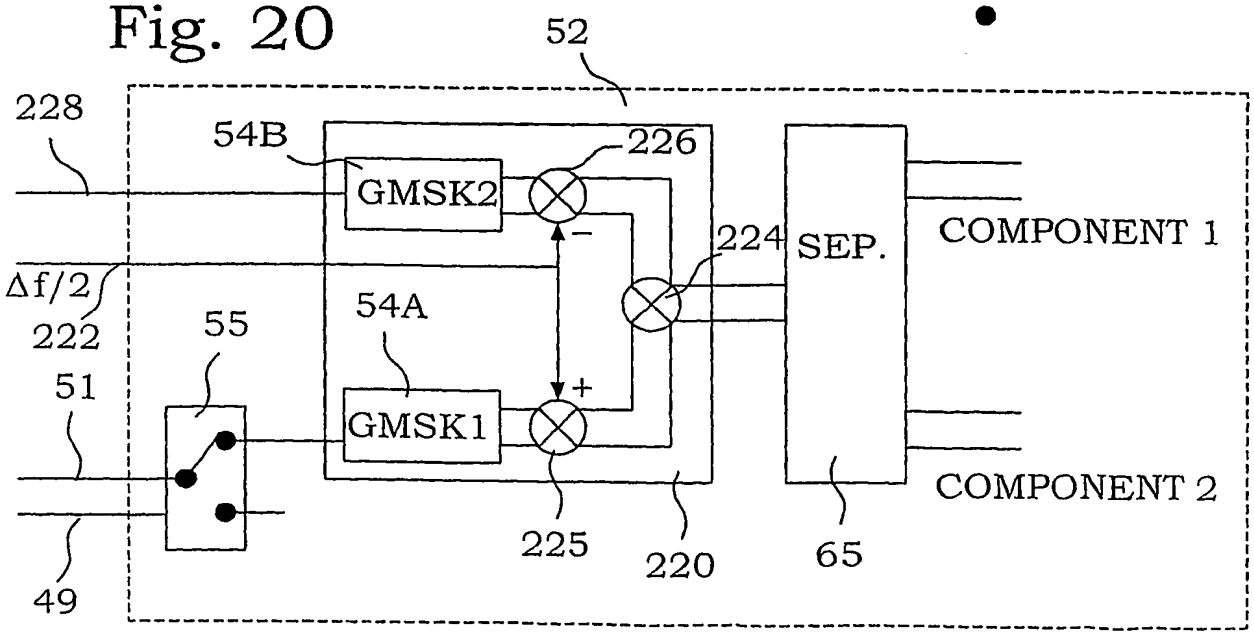



Fig. 20